

# CYLINDER HEAD/VALVES

## SPECIFICATIONS

Unit: mm (in)

ITEM			STANDARD	SERVICE LIMIT
Cylinder compression			1,275 – 1,314 kPa (13.0 – 13.4 kgf/cm <sup>2</sup> , 185 – 191 psi) at 300 min <sup>-1</sup> (rpm)	_____
Cylinder head warpage			_____	0.10 (0.004)
Valve, valve guide	Valve clearance	IN	0.16 ± 0.03 (0.006 ± 0.001)	_____
		EX	0.22 ± 0.03 (0.009 ± 0.001)	_____
	Valve stem O.D.	IN	3.975 – 3.990 (0.1565 – 0.1571)	3.965 (0.1561)
		EX	3.965 – 3.980 (0.1561 – 0.1567)	3.955 (0.1557)
	Valve guide I.D.	IN	4.000 – 4.012 (0.1575 – 0.1580)	4.04 (0.159)
		EX	4.000 – 4.012 (0.1575 – 0.1580)	4.04 (0.159)
	Stem-to-guide clearance	IN	0.010 – 0.037 (0.0004 – 0.0015)	0.075 (0.0030)
		EX	0.020 – 0.047 (0.0008 – 0.0019)	0.085 (0.0033)
	Valve guide projection above cylinder head	IN	13.10 – 13.30 (0.516 – 0.524)	_____
EX		11.30 – 11.50 (0.445 – 0.453)	_____	
Valve seat width		IN/EX	0.90 – 1.10 (0.035 – 0.043)	1.5 (0.06)
Valve spring free length		IN/EX	35.36 (1.392)	33.86 (1.333)
Valve lifter	Valve lifter O.D.	IN/EX	25.978 – 25.993 (1.0228 – 1.0233)	25.97 (1.022)
	Valve lifter bore I.D.	IN/EX	26.010 – 26.026 (1.0240 – 1.0246)	26.04 (1.025)
Camshaft	Cam lobe height	IN	36.140 – 36.380 (1.4228 – 1.4323)	36.11 (1.422)
		EX	35.300 – 35.540 (1.3898 – 1.3992)	35.27 (1.389)
	Journal O.D.		23.959 – 23.980 (0.9433 – 0.9441)	24.955 (0.9825)
	Runout		_____	0.05 (0.002)
	Oil clearance		0.020 – 0.062 (0.0008 – 0.0024)	0.10 (0.004)

## TORQUE VALUES

Cylinder head sealing bolt	32 N·m (3.3 kgf·m , 24 lbf·ft)	Apply a locking agent to the threads
Cylinder head socket bolt	47 N·m (4.8 kgf·m , 35 lbf·ft)	Apply oil to the threads
No.1 intake vacuum port plug	3 N·m (0.3 kgf·m , 2.2 lbf·ft)	
Cylinder head cover bolt	10 N·m (1.0 kgf·m , 7 lbf·ft)	
Camshaft holder flange bolt	12 N·m (1.2 kgf·m , 9 lbf·ft)	Apply oil to the threads
Breather plate flange bolt	12 N·m (1.2 kgf·m , 9 lbf·ft)	Apply a locking agent to the threads
Cam sprocket bolt	20 N·m (2.0 kgf·m , 14 lbf·ft)	Apply a locking agent to the threads
Cylinder head stud bolt	See page 1-14	
Cam chain tensioner cap nut	12 N·m (1.2 kgf·m , 9 lbf·ft)	
Cam chain tensioner lifter sealing bolt	10 N·m (1.0 kgf·m , 7 lbf·ft)	
Timing hole cap	18 N·m (1.8 kgf·m , 13 lbf·ft)	Apply grease to the threads